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ABSTRACT

The purpose of this article is to bring together the work of Jurgen Ruesch, Gregory Bateson, Paul Watzlawick, and Jay Haley in order to reveal their combined contribution to a systemic understanding of communicative behavior. Emphasis is upon the interactional and circular pattern of human communication, rather than on the linear, or cause/effect, analysis. The theoretical constructs and application of the systemic approach to human communication are developed in this article as a model for initiating change in human behavior. The article provides insight into the systemic nature of normal, daily communication and is of particular benefit to those interested in helper/helpee or health communication. (Author/JM)

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SYSTEMIC APPROACH TO HUMAN COMMUNICATION: A SYNTHESIS OF THE WORKS OF RUESCH, BATESON, WATZLAWICK AND HALEY

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The purpose of this article is to bring together the work of Jurgen Ruesch, Gregory Bateson, Paul Watzlawick, and Jay Haley in order to reveal their combined contribution to a systemic understanding of communicative behavior. Emphasis is upon the interactional and circular pattern of human communication, rather than linear or cause-effect analysis. The theoretical constructs and application of the Systemic Approach to Human Communication are developed in this article as a model for initiating change in human behavior. This article provides insight into the systemic nature of normal daily communication and is of particular benefit to those interested in helper-helpee or health communication.

BASIC CONSTRUCTS OF THE SYSTEMIC APPROACH TO HUMAN COMMUNICATION

The Systemic Approach to Human Communication lends understanding to typical problems of escalation of conflict and misperception of communicative events. A systemic understanding of communicative behavior visualizes Person A affecting Person B and Person B in turn affecting Person A. This circular or systemic view of human communication is quite different than the traditional linear conception of communication where Person A affects Person B without being affected in return. A teacher (Person A) may attempt to motivate a student (Person B) by pushing him to achieve a particular goal. The student may perceive the teacher's

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intended caring act as a form of punishment. Thus, he withdraws from his schoolwork to an even greater degree, leading the teacher to push him still harder. This is an example of systemic communication, in that the teacher's communicative behavior has affected the student and the student's communicative behavior has in turn affected the teacher, resulting in escalation of the problem. The goal of this article is to provide an interpretative framework for understanding the systemic and often escalating nature of communication. The works of Jurgen Ruesch, Gregory Bateson, Paul Watzlawick, and Jay Haley* are combined in an effort to provide a cogent description of the Systemic Approach to Human Communication.

The Systemic Approach to Human Communication emphasizes the importance of a systemic view of human interaction, when one attempts to understand the complexity of an individual's problem. Human events are not linear or simple cause-effect happenings; rather a circular interconnected system is perpetuated. The Systemic Approach to Human Communication emphasizes the ongoing interaction that affects each participant. Systemic analysis considers all possible variables (a person's environment, culture, biology, and significant others) and how each of these elements contributes to the definition of the situation. In the Systemic Approach to Human Communication, all components need to be regarded as significant. However, systemic analysis is not a mechanistic, additive theoretical perspective. It is a holistic perspective, from which human interaction is viewed. The dictum, "The whole is greater than the sum of the parts," is applicable to

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*This article and the above authors have been influenced by General System Theory, but their work should not be mistaken for General System Theory. Modification of certain constructs of General System Theory by the previously stated persons has occurred in order to accommodate analysis of human behavior.

the Systemic Approach to Human Communication. If each event affects another and is also affected by another, an additive interpretation of events is not adequate; a circular or systemic, rather than linear view of communicative behavior is required.

From Psychoanalysis to Systemic Interpretation

Jurgen Ruesch and Gregory Bateson in Communication: The Social Matrix of Psychiatry emphasized the importance of possessing a circular (or as this article emphasizes, a systemic) view of human communication if one is attempting to understand the complexity of an individual's interactional system. Ruesch and Bateson have attempted to move away from the traditional modes of psychoanalysis. The four major premises which they espouse are: (1) Emphasis has gone from the linear or mechanistic interpretations of causal etiology to a more circular interpretation which is sensitive to feedback and self-corrective change. (2) Movement from explaining all behavior (past and present) to the study of only an individual's current behavior patterns has occurred. Little usefulness is derived from exploring the individual's past behavior, according to Ruesch and Bateson. The exploration centers around the present, not the past of the individual's life. Thus, Ruesch and Bateson content themselves with comparing an individual's present deviant behavior with the social system of a client, which may have promoted the undesired action. (3) A move from structural models of intrapsychic interpretation to interpersonal and process models of counseling has happened. "As Ptolemy once postulated that our earth was the center of the astero-physical world, so Freud placed the intra-personal processes at the center of all events. Today we must recognize that such a position is untenable."(4) The approach of Ruesch and

Bateson incorporates society, culture, and other persons in its understanding of an individual. The need to ask why something happened or to understand the intrapsychic processes that motivated an individual is voided. Realization that one's understanding of the intrapsychic processes are only guesses has led to the question, "What is the pattern of the behavior and how does it fit into the normal pattern of expression that is accepted by one's culture?" Thus, the concept of the black box has been accepted, in order to demonstrate that:

> . . . what 'really goes on inside the box. . . is not essential for the study of the function of the device in the greater system of which it is a part. . . . Such an approach . . . characterizes an important recent trend in psychiatry toward viewing symptoms as one kind of input into the family system rather than as an expression of intrapsychic conflict.(5)

(4) An acute awareness of the "part and whole" properties of the human person is acknowledged. A recognition that both the part and whole needs to be given serious attention has led to the observation that the individual is part of the societal matrix and is greatly influenced by it and is also an independent person capable of autonomous movement (the whole function of the human being). Recognition of one's relationship to his social matrix is necessary if one is to understand the complexity of the human event. Thus, one needs to understand the human being as part and whole (self and social context), because both functions affect his life in a significant, even though not always overtly visible, manner.(4)

Ruesch and Bateson offer an alternative to the reductionistic cause-effect mode of analysis, which has dominated the scientific community. They attempt to understand a patient's contemporary concerns, while incorporating the social, cultural and interactive nature of his living system (Gestalten), which is necessary to understand the systemic nature

of human communication. They state the need to consciously recognize the systemic nature of man--how he is affected by external factors and in turn how he influences them. To understand an individual, one needs to comprehend a much larger Gestalten, awareness that the person is affected by his culture, society, and significant others, rather than propelled solely by his intrapsychic processes.

Ruesch and Bateson culminate their work by demonstrating the similarities between the humanist and the communication engineer in their acceptance of indeterminism and open theoretical systems. Both the humanist and the communication engineer who possesses a systemic view of human communication are concerned with looking at human events from a holistic perspective. Each is fearful of clear, precise and mechanistic interpretations of the life process. A communication engineer acknowledges the systemic and circular nature of events, thereby foregoing the illusion of simple cause-effect or stimulus-response explanations of the human process. He also advocates the use of an open system, which allows change and spontaneity to occur. There is much that a communication engineer and a humanist have in common. Thus, the systemic analysis of communication is a humanistic way to view human relationships in a scientific manner.

If one follows the propositions set forth in Communication: The Social Matrix of Psychiatry, one attempts to observe people in situations in which they normally interact, in order to understand their interpersonal behavior. One cannot adequately understand another's typical communicative behavior outside his daily environmental setting.(3) A juvenile probation department in a midwestern city attempted to send many of its "delinquent" youth to a farm environment. The youth usually were counseled and trained to efficiently complete the daily farm chores. In six months to a year,

these individuals were released to their home environments. Yet officials were dismayed when the juveniles engaged in delinquent behavior as soon as they returned to the city environment. Why did the children return so quickly to their deviant behavior patterns? The probation officials did not account for the system in which the children lived. The skills of farming were not applicable to the city environment. Indeed, awareness of group behavior and the total system in which an individual lives is essential, if change is to last.

Levels of Communicative Behavior

Systemic analysis deals with the information pieces or communication that occurs in the interactive setting between persons. (Communication is equated with behavior in this article.) The area of communication that this study investigated is called the pragmatics of communication. Pragmatics is interested in how communication affects behavior.(5) From a pragmatics point of view, communication is much more than a singular overt communicative behavior; each communication is accompanied by a qualifying message. Numerous examples can be cited in which an individual hears one message and it is qualified with congruent or incongruent accompanying behavior. The individual who verbally seems interested in another, but his behavior tends to say he does not care, demonstrates the incongruent qualifying message. The person who says he enjoys his work and appears relaxed in behavior and voice is probably displaying a congruent qualifying message.(2)

Qualifying messages often indicate the state of the relationship between two persons. Qualifying messages are metacommunication events, or comments on the communication. "Every communication has a content and a relationship aspect such that the latter classifies the former and is therefore a metacommunication."(5) The content of a communicative exchange

is the information; the qualifying message or metacommunication event is the manner in which the content is said or the accompanying body movement.

> An employee may tell his boss what to do, thus defining their relationship as one between equals, but he may qualify his statement with a 'self-effacing' gesture or a 'weak' tone of voice and thereby indicate that he is secondary in their relationship and not an equal. When messages qualify each other incongruently, then incongruent statements are being made about the relationship. If people always qualified what they said in a congruent way, relationships would be defined clearly and simply even though many levels of communication were functioning. However, when a statement is made which by its existence indicates one type of relationship and is qualified by a statement denying this, then difficulties in interpersonal relationships become inevitable.(2)

Each communicative event also consists of digital and analogic communication. A digital exchange between two individuals is a verbal communicative event. Analogic communication is composed of all communicative behavior that is not verbal information and establishes the relationship between persons. Due to the verbal nature of digital communication, it is usually more precise than analogic communication.(5) The situation often determines which type of communication is most appropriate. One can feel great frustration when the wrong mode of communication is utilized, supposedly for his benefit. If an individual is quite depressed, someone might use digital communication to demonstrate how much he has going for him and how his concerns are ill founded. This may or may not work, depending on the person and his situation at that moment. What the individual may desire is just to have someone be with him and to have concern communicated analogically (silently), rather than verbally. Analogic communication is vague and amorphous, thereby lending itself to misinterpretation. But the closer the relationship, the more accuracy and security one usually feels in an analogic exchange. Communication is more complex than simply listening for verbal information. One needs to be sensitive to

both the relationship and the information, which are revealed through the analogic and digital modes of communication.

Relationship and Communication

The relationship level of communication tends to have one of three effects: (1) One can confirm the other's view of himself. Without this confirming part of communication, no one would venture beyond the initial exchange of information. ". . . confirmation . . . is probably the greatest single factor ensuring mental development and stability that has so far emerged from our study of communication."(5) It is this primal accepting encounter between persons that enhances an individual's mental stability. (2) One can reject the other's view of himself. This rejection does not negate the individual's perception of himself, but it demonstrates that the observer does not collaborate in the perception. This often occurs in helper-helpee relationships and can produce beneficial results. The helpee does not always accept the other's self-perception. (3) One can also disconfirm another, which is the most pathological way of responding to an individual. The person is treated as a non-entity or a non-person. "In other words, while rejection amounts to the message 'You are wrong,' disconfirmation says in effect, 'You do not exist.'"(5) Thus, through communication, influence is exerted on another, which may range from a constructive influence to a destructive failure to even acknowledge the presence of the other.

Jay Haley emphasizes three types of relationships that people engage in: (1) A symmetrical relationship involves two equal persons in a competitive type of environment. Each individual is adjusting for position, in an attempt to equalize power and status in the relationship. (2) A complementary relationship is a one-down or a one-up situation. Two persons

operate in a manner that creates one of these positions for each. The dominant-submissive and masochistic-sadistic relationships are exemplary of the complementary relationship. (3) A metacomplementary relationship is when one person permits or forces the other individual to define the relationship in a particular manner. Thus, the individual does not attempt to define the status of the relationship, but he does manipulate another to do so, thereby promoting a metacomplementary relationship.(2) Indeed, all of the above relationships exist in one's life at different times. But, if one of these types of relationships becomes too inflexible and dominant, pathology can occur. "It is possible that, actually, no healthy equilibrated relationship between two groups is either purely symmetrical or purely complementary, but that every such relationship contains elements of the other type."(1)

When a complementary or symmetrical relationship is perpetually increased, schismogenesis is likely to prevail; the competitive or dominant-subordinant relationship will be escalated to a pathological degree.(1) If a minority group is continually pushed farther into a complementary one-down position, a schismogenic process can transpire. In a symmetrical relationship, such as the arms race between the United States and Russia, the constant competition leads to schismogenesis. Thus, schismogenesis is a dominant and rigid relationship that gets out of control. This runaway state of the system can be quite dangerous, once it begins to escalate; and the longer this progressive state persists, the more difficult it is to stabilize.

Self-Correcting Nature of Communicative Interaction

The reason schismogenesis does not occur more often and lead to a pathological state is basically due to the conservative and resistive nature of systems to change. Systems seek a steady state or a homeostatic

state that is resistive to change. A system usually has many subsystems that allow changes to occur within the system, which allow the status quo to remain. For example, a wife asserts herself and takes off one night a week to play bridge with her friends. But the husband finds other ways to keep the relationship in the same one-down position--he acts as if he actually suggested that she go out with her friends. The tendency of the system to restore itself to its established norm allows changes to occur that do not really result in change. This change within a system that does not result in a real change will be clarified later in this article, when first and second-order change is discussed.

The systemic or circular nature of communication also promotes schismogenesis, which is often referred to as a regenerative circuit in communication engineering. The initial influence (A) is eventually influenced by the last unrepeated variable in the circuit (N), thereby pushing the system into ever greater intensity.(1) A husband nags at his wife to enjoy herself more often and then he will feel more satisfied; but his nagging causes her to enjoy herself less and results in further depression on his part. Fortunately, there is usually a way out of the vicious cycle in which persons often find themselves. This change in the status quo is referred to as a restraint or degenerative circuit. This usually consists of one of the members changing his or her behavior which disrupts the system, or utilizing metacommunication, commenting on the communication, which makes the members aware of the problem that exists in their particular system of communication.

Both schismogenic (regenerative circuits) and restraint (degenerative circuits) mechanisms are present in each system; thus a single event can result in either occurring. This is exemplified by the parent who says,

"I do not want you to smoke," and the child does not smoke (degenerative event). But, if the parent continues to say over and over again, "I do not want you to smoke," the child feels that he should investigate why smoking is so "bad". Thus, he begins to smoke (regenerative event). If a request is verbalized too harshly and/or with too great a frequency, a former restraint can initiate a regenerative or schismogenic experience.

One is not always aware of whether his action will be a regenerative or degenerative action; therefore one must remain vigilant and attentive to the system he is involved with until he can determine the momentary result of his efforts. One must be attentive to the feedback that occurs in the system. Within an interpersonal system both positive and negative feedback are necessary. Positive feedback allows deviation and change to occur and negative feedback permits the perpetuation of the norm. Interpersonal systems, such as families, stranger groups, coworkers, or even international relationships, are feedback loops, since Person A affects Person B and Person B affects Person A. Different types of feedback are used in these systems, depending on whether the status-quo or change is desired.(5)

Recalibration of the Communicative System

Each system allows a certain degree of variation within a given range. But, when the deviation becomes too great, negative feedback pushes the situation or person back to the established norm. This consistency within a fairly defined range is referred to as a fixed range or calibration. Calibration is the setting or rule for a specific system; it must not be ignored, if a homeostatic state is to continue. Thus, each system has a setting under which it operates. The thermostat is an excellent example of this; one sets the thermostat at a particular

calibration and when the house becomes too cold this acts as negative feedback and more heat is produced, thereby maintaining homeostasis within the predetermined range of variation. This occurs quite often in families; only so much deviance is permitted before negative feedback (such as punishment or pleading) is utilized to bring a member back to the norms of the family system.(5)

However, there are times in which one breaks out of the calibrated system and recalibrates the range of the system. If one resets his thermostat, the former calibrated system is void and a step-function occurs. A step-function is the recalibration of the system, which results in a disruption or a restabilization of the system. Indeed, there are times that in order for stability to be achieved one needs to adopt a different attitude, accept a new job, slow down the desire for promotion, etc. A step-function requires one to do more than simply adjust within an assigned range; it requires one to establish another calibration.(5)

Meaning and Pattern in Communication

The study of the pragmatics of human communication is not concerned with the why of an event, but rather with the what. What is the pattern? Thus, pattern becomes meaning in this type of conceptual system.

> 'Meaning' may be regarded as an approximate synonym of pattern, redundancy, information, and 'restraint', within a paradigm . . . Any aggregate of events or objects (e.g., a sequence of phonemes, a painting, or a frog, or a culture) shall be said to contain 'redundancy' or 'pattern', . . .
>
> The essence and raison d'être of communication is the creation of redundancy, meaning, pattern, predictability, information . . . (1)

Meaning cannot be discovered until a pattern of interaction displays itself. No interpretation of the intrapsychic processes occurs; rather meaning is the behavior pattern that reveals itself consistently. If

a man constantly responds to others as if they are inferior, his relationship pattern reveals a one-up complementary interaction (difference is maximized). If an individual is highly competitive in multiple areas of competence, this demonstrates a symmetrical pattern of relationship (difference is minimized). Thus, if one desires to interpret behavior, he must understand the pattern of an individual's behavior; one isolated event is certainly not sufficient.

An interactive system has its own peculiar behaviors that are redundant enough to establish a pattern, which are observable to an outsider. But it need not be apparent to the individuals who interact in the system. A family establishes a pattern in which the husband insults the wife; she then becomes increasingly cold and sarcastic toward him. The couple is usually unaware of this pattern; they feel depressed and disillusioned about their marriage. An outside observer is necessary if the system is to be discovered. Thus, intervention by a person qualified to analyze and understand the pragmatics of human communication is often necessary if a step-function is to be provided that allows the individuals to escape their calibrated system.

A similar event occurs when two individuals are aware of their dissatisfaction in their relationship, but each believes the other is the cause of the friction. The husband comes home from work late and his wife nags at him. He says he returned late because she nagged. But she believes that if he would only come home on time, nagging would not be needed. This variance in views regarding the communication is referred to as punctuation of events.

> To an outside observer, a series of communications can be viewed as an uninterrupted sequence of interchanges . . . . Disagreement about how to punctuate the sequence of events is at the root of countless relationship struggles

> . . . . The nature of a relationship is contingent upon the punctuation of the communicational sequences between the communicants.(5)

The same communicative event can be witnessed by two persons involved in a relationship and quite different interpretations can occur. Which individual is correct? In many cases, neither person is actually wrong. They simply focus in on different segments of the circular transaction. There is often not a conscious awareness that Person A cannot communicate with Person B, without being affected by him. The fact that each person is constantly affected by the other demonstrates the circular nature of communication. Thus, each person can interpret part of the circle. But, it usually takes an outside observer to understand the varying ways in which the system is punctuated. The outside observer then utilizes metacommunication (he comments on the communication) in order to demonstrate the authentic but only partial understanding of each individual in the communicative system.

Double Bind Communication

An outside observer can often detect pathological relationships within a system that can be quite devastating, if they continue in their present form. A poignant example is double bind communication. According to Gregory Bateson, the necessary environmental patterns that encourage a double bind are the following: (1) Two or more persons are necessary to start the double bind system. One of the members needs to be designated as the victim or the individual who will be placed in a stressful situation where he is constantly given a message accompanied by an incongruent qualifying message. (2) Repeated experience of the double bind situation is necessary. A pattern needs to be developed which establishes itself as a recurrent theme; one single isolated experience is not sufficient

for a double bind to become part of one's perception of reality. (3) A primary negative injunction becomes part of the person; his learning is based on avoidance, not reward. He engages in behavior that authority desires, but because of his fear of punishment, not due to hope of securing a particular reward. (4) A secondary injunction, which conflicts with the first injunction is an integral part of the double bind system. A child is punished for an act and the parent tells the child to not regard him as authoritative or a punishing agent. Yet, that is exactly what the parent was in that instance. (5) The individual who is the victim feels a real and/or illusionary (but nevertheless potent) negative injunction, which prohibits him from escaping the system. Escape for a child is virtually impossible, thus it is easy to understand how a double bind situation is particularly difficult for children. In adults, the prime motivation to remain in the system is promise of rewards, such as love. (6) Finally, when the individual is accustomed to viewing himself in a double bind, it is no longer necessary to have the above elements happen to him to perpetuate his condition. He internalizes the double bind view of the world. Indeed, the individual accepts a pathological picture of reality that drastically decreases his ability to trust another human being, due to his constant perception of conflicting messages.(1)

A person remains in the pathological communicative state of a double bind as long as he is so afraid of losing the relationship that he is involved in, that he permits the use of elements which produce a double bind situation. The person cripples his ability to possess a healthy relationship by desiring the relationship too much. He does not risk using metacommunication by commenting on the actions of the person(s) that put him in a double bind situation. Thus, a person in a double bind

communicative situation must risk testing the strength of a relationship by commenting on the contradictory messages he is receiving or remain powerless and at the mercy of opposing information.

THE APPLICATION OF THE SYSTEMIC APPROACH TO HUMAN COMMUNICATION

The following approach to human communication can appear calculated and manipulative. But one should recognize: (1) The Systemic Approach to Human Communication is closely associated with the humanistic movement, which was described earlier in this article. (2) Every helping system is manipulative, in the sense that the helper has conscious and unconscious expectations and hypotheses about what constitutes the "healthy" individual.

> From past experience we fully expect to be attacked by some for the 'manipulative', 'insincere' nature of our approach--both practical and conceptual--to human problems . . . . It also seems associated with the idea that 'manipulation' is not only bad, but can be avoided. Nobody, unfortunately, has ever explained how this can be done. . . . The analyst who silently sits behind his reclining patient, or the 'non-directive' therapist who 'merely' repeats the verbal utterances of his client, exert a fantastic amount of influence by that very behavior, especially since it is defined as 'no influence'. The problem, therefore, is not how influence and manipulation can be avoided, but how they can best be comprehended and used in the interest of the patient.(6)

The pathological patterns of interpersonal behavior can be analyzed and altered by applying the systemic nature of communication in a helping situation. Even though the participants may be unaware of their own self-defeating behavior, they can often be helped by an outside communicative observer.

First- and Second-Order Change

According to Watzlawick, Weakland, and Fisch in the book Change: Principles of Problem Formation and Problem Resolution, there are two

types of change: (1) First-order change involves a change within a calibrated system. It is a change that does not usually make a significant difference. The change occurs within an invariant system. (2) Second-order change is a recalibration of the system. It is change outside the system that produces a significant difference. Only one initial example will be formulated here, but further clarification of the two processes of change will occur in the following material. In an election year when the American public will vote for another President, a first-order change should occur. Even if someone other than the present president is elected, there would still be little change. The change would fall within the range of variance within the democratic system. But, if the individual who wins the presidential race were to apply his own solution to the outcome of the race (first solution), such as to set up a Marxist government, a second-order change would occur. The debate is not whether this would be possible, but rather that second-order change perceives the first-order solution as the real problem, therefore a solution to the solution occurs.

First-order change is based on the Theory of Groups. Group Theory was formulated in the early nineteenth century. The term group was brought forth by the French mathematician Évariste Galois. Group Theory then became one of the most creative branches of mathematics, and since 1900, it has played a significant role in quantum and relativity theories. The basic postulates which substantiated Group Theory have the following properties: (1) The members of the group have one common characteristic (all other parts of their nature are irrelevant). Any combination, addition or subtraction of members, is itself a member already existing within the group. This makes it impossible for any combination of members to find themselves outside the group. The integers on a clock are a good

example; there is no way one can combine the members and get a result outside the group (e.g., 12:00 p.m. plus two hours equals 2:00 a.m.). This property allows the group to be locked in and resistant to change outside its own membership. (2) One can combine the members of the group in a variation of sequences, yet the result of the various combinations is the same. A simple example is when one receives change from a clerk; it is of little consequence if the dollars, quarters, dimes, etc. are returned in a particular order. The only thing of significant consequence is that one receives the final amount which is due him. (3) An identity member is prevalent in a group. In addition, zero is the identity member; in a group of related or discordant sounds, silence is the identity member. (4) Each group possesses a reciprocal or opposite for each of its members (e.g., $4 + (-4) = 0$). (6)

The main element of illumination in the properties of a group is that many changes can occur that create no difference within the group.

> . . . the Theory of Groups, even in the primitive terms used here to describe its basic concepts (illustrating ways in which particular changes may make no difference in the group), provides a valid framework for thinking about the peculiar interdependence between persistence and change which we can observe in many practical instances where plus ca change, plus c'est la même chose. [The more something changes the more it remains the same.] (6)

From this theoretical knowledge based on Group Theory, first-order change is formulated. Indeed, it is quite easy to think of changes that really do not alter the situation. This is typified in the following examples. A man accepts a new job, because he previously argued with his co-workers, but he finds similar trouble in his new location. An individual gives up cigarettes because it is a nervous habit, but then gains twenty pounds from overeating. In each case, the real problem still exists--the first man cannot cooperate with his fellow workers and the second cannot release

his tension in a constructive manner. Indeed, these are prime examples of Group Theory or first-order change--a change that is not really a change applicable to the fundamental problem.

Second-order change is based on the Theory of Logical Types, which is concerned with the varying levels of abstraction in the manner in which one uses language and classifies events.

> One essential axiom of the Theory of Logical Types is that 'whatever involves all of a collection must not be one of the collection,' as Whitehead and Russell state it in their monumental work Principia Mathematica. It should be immediately obvious that mankind is the class of all individuals, but that it is not itself an individual. Any attempt to deal with the one in terms of the other is doomed to lead to nonsense and confusion. For example, the economic behavior of the population of a large city cannot be understood in terms of the behavior of one inhabitant multiplied by, say, four million. This, incidentally, was precisely the mistake committed in the early days of economic theory and is now scornfully referred to as the Robinson Crusoe economic model. . . .
>
> Outcomes of the kind mentioned are the result of ignoring the paramount distinction between member and class and the fact that a class cannot be a member of itself.(6)

This demonstrates the danger in not acknowledging the hierarchical nature of the world in which one exists. The confusion in logical typing can be avoided if one is aware that varying levels of abstraction are involved in the articulation of a total event and a statement of a particular of that occurrence. If one is unable to keep the logical levels apart, paradox and confusion result.

Second-order change usually occurs spontaneously and it is difficult to state the impetus that allows it to occur. Often a second-order change results from the switch to a higher level of abstraction (another logical type) that allows one to transcend a seemingly inescapable paradox. A paradox involves a situation in which an individual feels he must choose A and not A. However, second-order change overcomes this dilemma by an attitudinal orientation that rejects the choice itself. This can be done

in two ways: (1) By living the process of life, rather than always chasing particular goals. "This is, presumably, also what St. Luke meant when he wrote: 'Whosoever shall seek to save his life, shall lose it: and whosoever shall lose his life shall preserve it.'"(6) Living the process of life does not mean one gives up goals, but rather the goals become a natural part of the process instead of the ultimate concern. One becomes a craftsman who enjoys his work, rather than only appreciating the visible fruits of his labor. (2) By utilizing metacommunication and commenting on the paradoxical situation in which one is involved. Earlier in the article, the need for metacommunication was demonstrated in the etiology of double bind communication. A person may be too dependent on the relationship to comment on the double bind situation in which he found himself. Second-order change is the reframing of a situation through the acceptance of a higher logical typing of the perception of an event. By enjoying the process or by using metacommunication, the individual eludes dealing with a single member of a class and is able to work with all alternatives, the entire class. Thus, he does not attempt changes within the system (first-order change) but acknowledges the entire system or class (second-order change).(6) Indeed, in many instances, second-order change is desired by a helper: he wants the other to reframe his attitudinal orientation toward existence.

Change of change, or a metachange, is the primary definition of second-order change. First-order change only attempts different changes within the existing system, but the problem still persists. A person having a dream can scream, or run and hide in his dream, (first-order change) but none of these behaviors will terminate the nightmare. However, if the individual awakens, a second-order change will occur. A shift to another logical type takes place, which is a metachange.(6) Indeed, it is a second-order change

that is usually necessary in order to truly alter the individual's response to life.

Control of the Relationship

The helper accepts the necessity of controlling the relationship in a complementary one-up manner. The helper needs to be in command of the events of the encounter, in order to be of influence in the change process of the other.

> . . . a patient's symptoms are perpetuated by the way he himself behaves and by the influence of other people intimately involved with him. It follows that psychotherapeutic tactics should be designed to persuade the individual to change his behavior and/or persuade his intimates to change their behavior in relation to him.(2)

Through the use of paradoxical control of the relationship change often occurs. A husband and wife always fight before supper. Yet they have visited multiple family therapists and no change has occurred. What can be done? Instead of teaching the helpee the symbol system which is utilized by the helper, reframing occurs: ". . . reframing presupposes that the therapist learn the patient's language, and this can be done much more quickly and economically than the other way around. In this approach it is the very resistances to change which can best be utilized to bring it about."(6) The fighting occurrences of the individuals are reframed. The helper poses a covert paradox, in order to gain control of the relationship with the other's symbol system. The helper tells the couple to go home and continue to fight, only with more vigor: (1) If the couple goes home and argues, they will have followed the rule established by the helper, thereby permitting him to control the relationship. (2) If the couple feels that they must disobey the helper and not argue, they succumb to the long range goal of therapy, change, and are again controlled by him. Often, if the

latter part of the paradox is followed, no further therapy is necessary. A second-order or attitudinal change occurs, which demonstrates the pleasantness of a peaceful existence. But, even if the paradox does not completely eliminate the problem, the helper gains control of the encounter. Once this is accomplished, he is in an influential position to foster change through his selective responses to the other, which will hopefully lead to a recalibration of the person's communicative system.

Conclusion

The Systemic Approach to Human Communication utilizes a number of constructs, which affords the human observer or helper a knowledge of the system that is operating. There is no desire to teach the helpee the theoretical constructions which support this approach. The main concern is to alter the deviant behavior that is disrupting the system or to provide a step-function that allows the interactional system to be recalibrated. This approach is an attempt to provide an outlet for a scientific and humanistic communication model that recognizes the systemic nature of communication, and aids another in the recalibration of his communicative system.

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